

V. CLAIMS

1    1. An image processing method for use on a data processing device, the method comprising  
2    • receiving at least one monocular video input image;  
3    • segmenting at least one foreground object from the input image;  
4    • applying at least one respective transformation to each segmented object and to the  
5       background, for each of a plurality of output images;  
6    • deriving the plurality of output images from the results of the respective transformations.

1    2. The method of claim 1, further comprising second segmenting at least one background object  
2       from the input image and applying a respective transformation to each segmented background  
3       object for each of the plurality of output images.

1    3. The method of claim 1, wherein there are two output images and two respective  
2       transformations are applied to each segmented object and two transformations are applied to  
3       the background to create the two output images.

1    4. The method of claim 1, further comprising displaying the plurality of output images in a  
2       combining device, so that the plurality of output images are perceivable by a user as a single  
3       image having enhanced three dimensional appearance.

1    5. The method of claim 1, wherein the respective transformations applied to the foreground

2 object make the foreground object stand out from the background.

1 6. The method of claim 5, wherein

2 • the receiving comprises receiving a multiplicity of monocular input images;

3 • the deriving comprises deriving a respective plurality of output images for each of the

4 monocular input images;

5 • the method further comprises displaying the respective pluralities of output images in a

6 combining device, so that the respective pluralities of output images are perceptible by a user

7 as a sequence of single images giving an illusion of motion and having an enhanced three

8 dimensional appearance in which the at least one foreground object moves separately from

9 the at least one background object.

1 7. The method of claim 6, wherein the at least one foreground object appears to move in the

2 output images, while at least a portion of the rest of the image appears not to move.

1 8. The method of claim 1, wherein the segmenting and applying involve using domain

2 knowledge to recognize positions of expected objects in the monocular input image and

3 derive positions of objects in the output images.

1 9. The method of claim 1, wherein the respective transformations for background pixels are

2 derived by comparing at least two monocular input images of a single scene.

1 10. The method of claim 1, further comprising, prior to applying the transformation,  
2 approximating a position of each segmented object as appearing on a fronto-parallel plane.

*Add A 11*